



**STATEMENT BY**  
  
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**U.S. DEPARTMENT OF COMMERCE**  
  
**BEFORE THE**  
**SUBCOMMITTEE ON ENERGY AND ENVIRONMENT**  
**COMMITTEE ON SCIENCE**  
**HOUSE OF REPRESENTATIVES**

**APRIL 15, 1999**

Mr. Chairman and Members of the Committee, I am pleased to appear before you today to discuss some of the Office of Inspector General's audit and inspection work related to the National Oceanic and Atmospheric Administration's ships and aircraft. I also will comment on our work regarding the NOAA Corps. Our most recent work has concentrated on NOAA's aircraft services.

While much of the debate has focused on NOAA's ships and to a lesser extent, its aircraft, we believe the more fundamental management challenge facing NOAA is the need to expand private sector participation in its marine and aeronautical data gathering and its oceanographic research. The goal should be to find and use the best ways to collect needed information and conduct vital research. For marine data and research, we have recommended that NOAA identify and thoroughly assess alternative approaches to relying on its own vessels to meet its oceanography, fisheries, and hydrography needs. In relation to aeronautical data collection, we have recommended that NOAA privatize its light aircraft operations. We recognize that our recommendations represent a major change in approach and attitude for NOAA. But the change, in our opinion, presents opportunities for significant benefits to NOAA's programs and U.S. taxpayers.

The number of NOAA Corps commissioned officers needed is directly linked to the overall challenge, as two of the Corps's three primary functions are to manage and operate NOAA's ships and aircraft. Its third function is to provide scientific and engineering support to NOAA's line offices. Thus, as NOAA relies less on its own fleet of ships and aircraft, fewer NOAA Corps officers are needed.

By changing the way NOAA acquires its ship- and aircraft-related support services, we believe:

- **Program officials will have greater control and flexibility in their choice of platforms.** By getting out of the business of owning and operating ships and aircraft, NOAA will not only save money, but also be able to take advantage of market rates and private innovation, and more quickly incorporate advances in technology. For example, with creative leasing arrangements, programs could retain the option of migrating to newer, innovative platforms more frequently than is possible if the programs must rely on long-term, in-house fleets.
- **Program officials will have greater control and flexibility in their choice of support services.** Once unburdened of the pressure to use in-house assets, programs can take advantage of the competition within commercial markets. When program managers articulate their data and research requirements in terms that markets can act upon, such as with performance specifications, contractors have the latitude to suggest more innovative, cost-effective solutions. In the past, contractors have complained that NOAA has effectively limited private-sector innovation by dictating the precise type of vessel required, in the case of charter contracts, or explicit procedures to be followed, in the case of contracts for hydrographic surveys. Contractors argue that they could provide better, and less expensive, services if NOAA would develop performance-based specifications, and allow the contractor to decide how to meet those specifications.

- **The full cost of ships, aircraft, and related services will be apparent to program managers.** It is currently difficult to link appropriated funds to many research outputs (let alone their impacts). For example, although the Congress appropriates amounts to NOAA programs for specific ship- and aircraft-based research projects, neither the Congress nor program managers are aware of the total amount spent by NOAA on these projects. This is because overhead, maintenance, and training are costs often not billed to program managers. Contracting for outside ships, aircraft, or related services will provide a tighter linkage between appropriated funds and program outputs.
- **The fleet will no longer compete with programs for budget and congressional support.** As budgetary pressure to cut expenses continues, program managers will have the opportunity to argue for their research needs independently of ship-based work done elsewhere in NOAA. Instead of being invested in an aging in-house fleet, millions of program dollars can be directed toward more cost-effective alternatives, such as private build/lease or charter, to collect data and conduct research.

In addition, approximately \$5 million appropriated annually for data acquisition is used to pay for uniformed personnel working in NOAA's line organizations. This situation results from the NOAA Corps's policy of regularly rotating its officers from ship and aircraft billets. Any downsizing of the Corps should translate into these funds being available for data acquisition efforts.

In support of our general conclusions that I have just outlined, I would like to summarize our audits and inspections relating to marine and aeronautical data acquisition issues, then briefly discuss our work relating to the Corps.

## **Marine Data**

In March 1997, we testified before this Subcommittee on our work related to the NOAA fleet and Corps. We noted then that despite specific guidance from the Congress, and similar recommendations from our office and prestigious scientific panels, NOAA continued to plan investments of millions of dollars in modernizing or replacing its aging in-house fleet of ships, rather than using those funds for more cost-effective alternatives.

The Congress, GAO, the Department's Chief Financial Officer, the OIG, and others have repeatedly urged NOAA to thoroughly explore alternatives to its plan to maintain a NOAA-designed, owned, and operated fleet for acquiring marine data. The Secretary and OMB have also recognized the need for NOAA to explore alternatives for acquiring marine data and conducting oceanographic research. For example, in prior budget guidance to NOAA, they have highlighted that the funding provided is for "equivalent fleet" resources, not necessarily the acquisition, construction, and operation of ships.

We are pleased to note that NOAA has made some progress in this regard, namely in the area of nautical charting. NOAA has used recent increases in appropriations to expand its use of private hydrographic surveyors, and in March and April 1998, it issued four contracts worth \$10.8 million for data collection.

We remain concerned, however, that NOAA is designing and planning to buy and operate four new fishery research vessels without thoroughly assessing and pursuing other viable alternatives. The President's budget proposes to spend a total of \$185 million for four new replacement fisheries research ships in fiscal years 2000-04, with \$52 million proposed for 2000 alone. An additional \$8 million is requested in 2001 to outfit the first ship. With the first ship projected for delivery in 2003, and the second in 2004, additional expenditures will be required after the five-year period to complete construction of the remaining ships. It is our understanding that NOAA has prepared a detailed data acquisition plan for its fisheries mission and intends to acquire the

new vessels through the Naval Sea Systems Command. However, to date, we have not seen NOAA's estimated operating costs or life cycle costs for the planned ships.

In 1998, NOAA requested retired Navy Admiral Craig Dorman to conduct a special study of NOAA's plans for the replacement of its fisheries research vessels. In his report, completed after extensive consultation with public and private sector experts, the admiral agreed that NOAA's aging fisheries research vessels needed to be replaced, but questioned NOAA's intent to acquire and operate the new fisheries research vessels without:

- a **national** plan for the use of the new vessels in conjunction with the nation's other oceanographic and fishery research and assets;
- a **national** plan, developed in conjunction with academia, industry, and other sponsors, for the development and fielding of technologies and techniques to improve the nation's fisheries, oceanography, and monitoring capabilities;
- an externally oriented approach to the acquisition and operation of the new vessels that provides for their full, efficient, and effective use in **collaboration** with other activities; and
- a commitment by NOAA, the Department, and OMB to request appropriate **resources** to fund the above three items, not just the acquisition of the ships.

We agree with those recommendations. While NOAA has traditionally obtained ship services from beyond its own fleet to support some of its fishery stock assessments and oceanographic research, we continue to believe opportunities exist for more outsourcing, particularly in the area of fisheries research. We continue to question the propriety of NOAA focusing its efforts on designing, owning, maintaining, and operating ships. Instead, the agency should clearly articulate its program needs for ship services to the private sector, academia, and other government ship

operators with the goal of identifying modern, more cost-effective platforms for its data collection needs.

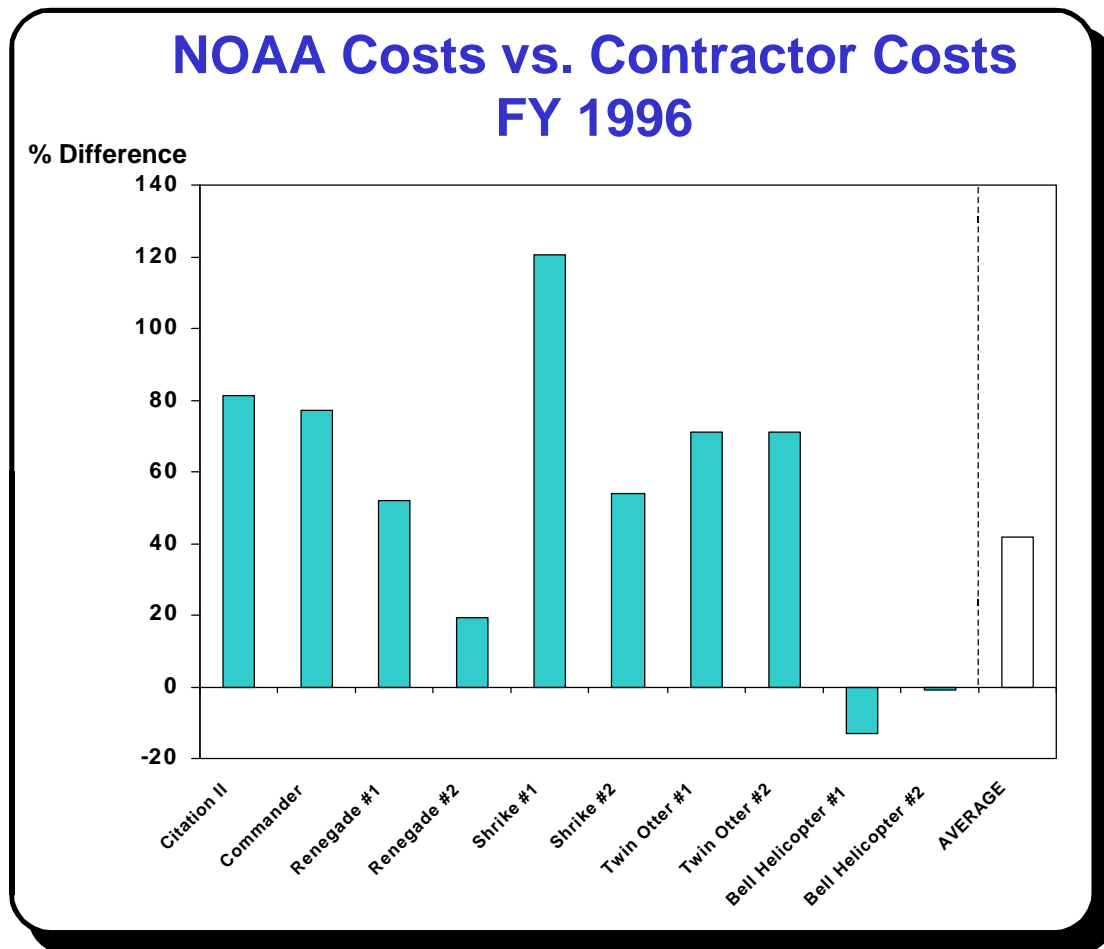
## **Aeronautical Data**

Since its establishment in 1983, NOAA's Aircraft Operations Center (AOC), now located at MacDill Air Force Base near Tampa, has been responsible for gathering atmospheric, oceanographic, and other data for such programs as hurricane and major storm research, aeronautical and nautical charting, climate and global change, and snow and aerial surveys. As NOAA's major flight operations group, AOC operates a fleet of 14 aircraft, composed of 2 heavy Lockheed P-3 Orions, 1 new mid-size Gulfstream-IV jet, 8 light fixed-wing aircraft, and 3 helicopters.

In December 1996, the President's Council on Integrity and Efficiency reviewed the management of federal civilian aircraft, including NOAA's, and found that it cost the government in excess of \$1 billion annually to operate its aircraft programs. Additional studies of operational efficiencies, commissioned by GSA, reported opportunities to reduce costs by \$92 million annually if most agencies consolidated their operations and entered into sharing arrangements.

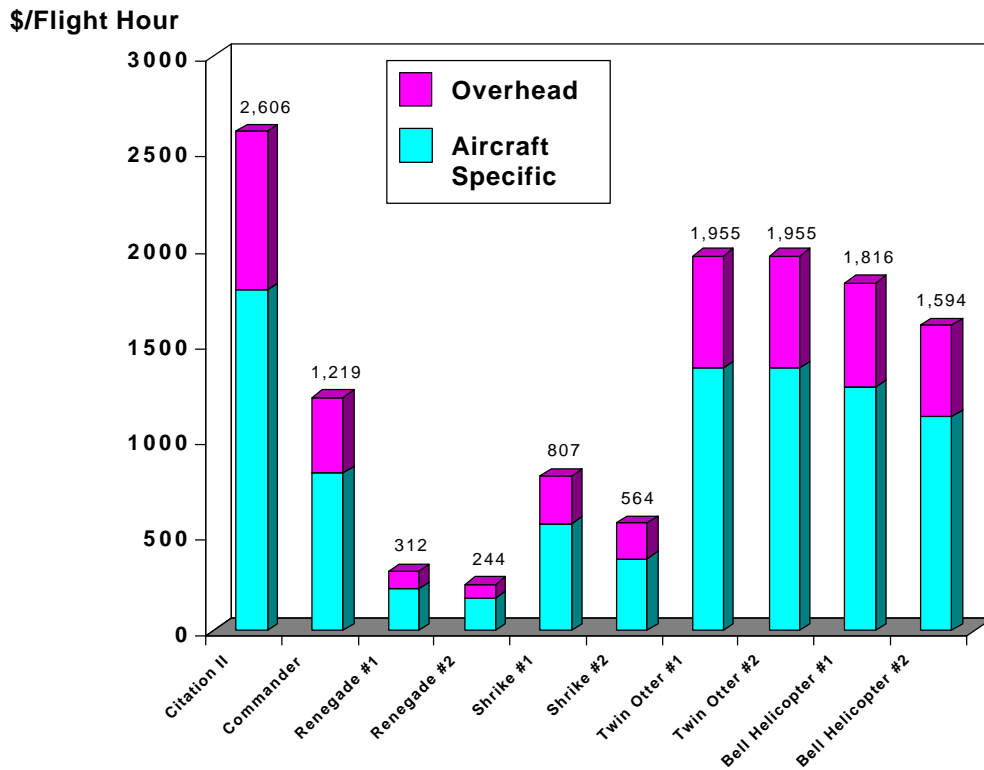
We subsequently conducted an audit to assess the cost effectiveness of NOAA's aircraft operations, in particular to determine whether outsourcing might be more cost-effective than agency ownership and operation in meeting NOAA's data collection requirements. We excluded from our cost comparison the two P-3 Orions that had unique capabilities not available elsewhere, the new Gulfstream-IV not scheduled for its first mission until fiscal year 1997, plus a helicopter that was out of service for fiscal year 1996, the period of our review. Our audit concluded that the full in-house cost of operating NOAA's eight light fixed-wing aircraft and two helicopters averaged 42 percent more than the cost to operate similar aircraft in the private sector. NOAA's full cost hourly rates significantly exceeded commercial rates for the eight light fixed-wing aircraft. Only two helicopters, used exclusively for interagency reimbursable work, were price

competitive with the private sector. In total, NOAA spent an additional \$1.9 million compared to private sector costs.



Although several factors contribute to the higher NOAA costs, the most significant one is NOAA's inability to achieve economies that are normally associated with aircraft available in the private sector. NOAA's operating costs include significant overhead costs incurred by the Office of NOAA Corps Operations and the Commissioned Personnel Center, as well as by AOC. Private contractors of light aircraft generally do not incur such overhead costs and, in combination with their marketing efforts to increase the number of billable hours, are able to lower their hourly charge for aircraft services.

## NOAA Aircraft Operating Costs FY 1996



In contrast, NOAA's light aircraft appear to still be operating at relatively low levels of activity. In our 1988 audit report on NOAA aircraft resources, we stated that AOC's aircraft utilization rate was low and was not increasing as NOAA expected. To increase usage, we recommended that AOC establish an annual aircraft utilization standard and periodically report on its progress in meeting the standard to the NOAA Aircraft Allocation Council, its oversight body. The AOC agreed to establish an annual standard of 250 hours per aircraft and to annually compare its performance against the standard. As we found in our 1995 report on AOC operations, AOC continued to report aircraft failing to meet the standard. We are updating the flight information for the light aircraft and helicopters for fiscal years 1997 and 1998 in order to verify the levels and trend of activity for the light aircraft, and can make that information available when our analysis is complete.



Other factors contribute to the higher NOAA cost per flight hour for its light aircraft, including:

- Operational costs rise substantially as aircraft age. The average age of NOAA's fixed-wing light aircraft and helicopters is over 15 years, and two of them are at least 21 years old.
- Higher training costs associated with the NOAA Corps's policy of periodic rotation of pilots to other positions within NOAA programs and the need to retrain replacement officers.
- The lack of adequate incentives to control costs because of the availability within the government of funds to cover rising costs, such as by reprogramming.

To achieve cost-effective aeronautical data collection, we recommended that NOAA restructure its aircraft operations by:

- Retaining the two P-3 Orions and the Gulfstream-IV.
- Discontinuing operating the eight fixed-wing light aircraft and the three helicopters and release them, in accordance with OMB Circular A-126, along with related spare parts.
- Fully complying with NOAA's established policy that program offices are to rely on the private sector, when economically advantageous, to provide aircraft services.
- Transferring AOC base funding for aircraft support to NOAA's line organizations, and implementing procedures to procure aircraft services from the most cost-effective private-sector sources.

NOAA disagreed with most of our conclusions and recommendations. Principally, NOAA does not agree that its light aircraft are significantly more costly to operate when their true costs are compared with the private sector. We are working with NOAA to address our differences of opinion and hopefully reach agreement on the actions to be taken to address our recommendations.

## **NOAA Corps**

NOAA's Commissioned Corps has three primary functions: (1) operate and maintain NOAA's ships, (2) operate and maintain NOAA's aircraft, and (3) provide scientific and engineering support for NOAA's line offices. The Corps's rotation policy calls for its officers to spend one-third of their career at sea, one-third on shore duty related to ship support, and one-third assigned to other NOAA positions.

In January 1996, NOAA announced its intention to implement the National Performance Review's recommendation to eliminate the Corps, and in May 1997, the Department submitted to OMB a legislative proposal and transition plan for accomplishing this. Although the proposal and plan addressed many of our concerns, one important issue remained unresolved: the maximum number of officers that should be converted to civil service positions. In our September 1997 report on our evaluation of the transition plan, we recommended that NOAA:

- Convert only 100 line-office billets to civilian positions. This represented the approximate number of positions that could be paid for from the line organizations' budgets without using funds from ship-support appropriations.
- Eliminate aircraft activities not directly related to NOAA's mission and limit the number of officer conversions for ship- and aircraft-related activities to 70 positions. Outsourcing options appeared to be readily available and cost effective. Creating no more than 70 civil service positions for ship and aircraft services would ensure sufficient staffing to

maintain essential in-house services while providing an incentive to use more cost-effective outsourcing options.

- Provide military retirement benefits to NOAA Corps officers with at least 15 years of service and convert only those officers not eligible to retire to the civil service.

NOAA disagreed with our conclusions and recommendations. However, the issue became moot with the passage of P.L. 105-384. This law authorized not less than 264 and not more than 299 commissioned officers on the active list of the NOAA Corps for fiscal years 1999 through 2003. The number of officers may be reduced below 264, with advance notice to the Congress, if the NOAA Administrator determines that it is appropriate, taking into consideration:

- the number of billets on the fisheries, hydrographic, and oceanographic vessels owned and operated by NOAA;
- the need for NOAA to collect high-quality oceanographic, fisheries, and hydrographic data and information on a continuing basis;
- the need for effective and safe operation of the fisheries, hydrographic, and oceanographic vessels;
- the need for effective management of the commissioned corps; and
- the protection of the interests of taxpayers.

As a result of the legislation, the three-year moratorium on new appointments of commissioned officers to the NOAA Corps was lifted. At this time, NOAA has limited recruitment to critical hydrography jobs. As NOAA continues its efforts to increase its outsourcing for data collection, a reduced fleet of ships and aircraft should continue to translate into a reduced NOAA Corps.

## **OIG CONGRESSIONAL TESTIMONY AND REPORTS RELATED TO NOAA FLEET, AIRCRAFT, AND CORPS**

### **Congressional Testimony**

- Statement by Frank DeGeorge, Inspector General, before the Senate Commerce, Science, and Transportation Committee, May 14, 1997
- Statement by Frank DeGeorge, Inspector General, before the House Science Subcommittee on Energy and Environment, March 13, 1997
- Statement by Frank DeGeorge, Inspector General, before the Senate Governmental Affairs Subcommittee on Oversight of Government Management, Restructuring, and the District of Columbia, March 10, 1997

### **Reports Related to Fleet**

- *Outsourcing Efforts for the Antarctic Marine Living Resources Charter*, IPE-8865, August 1996
- *NOAA Should Decommission Its Ships and Terminate the Recent Billion-Dollar Fleet Modernization Plan*, IPE-7794-6-0001, March 1996
- *Fleet Modernization Program Needs Fundamental Restructuring to Meet NOAA's Oceanic Missions*, SED-6659, March 1995
- *Semiannual Review of the Fleet Replacement and Modernization Program*, EAD-6256, March 1994
- *Semiannual Review of the Fleet Replacement and Modernization Program*, EAD-5656, September 1993

### **Reports Related to Aircraft**

- *NOAA's Light Aircraft Fleet Should Be Privatized*, STD-9952-8-0001, August 1998
- *Office of Aeronautical Charting and Cartography Should Be Transferred to FAA*, IPE-8646, September 1996
- *Aircraft Operations Center Needs Management Attention*, ATL-5958, March 1995
- *OA's Inefficient Use of Aircraft Resources Has Adversely Affected NOAA Programs*, A-581-8-0014, March 1988

### **Reports Related to NOAA Corps**

- *The NOAA Corps Transition Plan Should Convert No More Than 170 Officers,*  
NAD-9087, September 1997
- *Excessive Costs in Assigning NOAA Corps Officers to Certain Shore-Based Positions,*  
STD-0194, September 1990



## **BIOGRAPHY**

### **GEORGE E. ROSS**

#### **ASSISTANT INSPECTOR GENERAL FOR AUDITING U.S. DEPARTMENT OF COMMERCE**

As Assistant Inspector General for Auditing, Mr. Ross is responsible for all Office of Inspector General audits, including financial statement audits, financial-related audits, and performance audits. Other responsibilities include Single Audit Act functions and indirect cost rate negotiations. The Office of Audits, with about 90 personnel, consists of four headquarters divisions and regional offices in Atlanta, Denver, and Seattle.

Mr. Ross had served as the Assistant Inspector General for Audit Resolution and Administration, with responsibility for all OIG support functions, including acquisitions, budget, human resources, information technology, publications, and quality assurance. Previously, as Assistant Inspector General for Compliance and Audit Resolution, he had been responsible for audit resolution and follow-up and the OIG's internal quality assurance program covering audits, inspections, and investigations.

Mr. Ross came to Commerce in June 1990 from the Department of Veterans Affairs. His assignments involved positions at the Boston VA Medical Center and VA's Central Office, including Special Assistant to the Deputy Administrator and Executive Assistant to both the Associate Deputy Administrator for Administration and the Associate Deputy Administrator for Planning and Finance.

Prior to joining VA in 1981, Mr. Ross held a series of positions in the Department of Energy's Office of Conservation and Renewable Energy, Office of the Chief Financial Officer, and Office of Resource Applications. Key responsibilities included liaison with the Office of Inspector General and external auditors and investigators.

From 1972 to 1978, Mr. Ross worked as a financial assistance specialist with Commerce's National Marine Fisheries Service in Gloucester, Massachusetts. He assumed that position following active duty with the Air Force Audit Agency. He retired as a U.S. Air Force reservist in 1991 with the rank of Lieutenant Colonel.

Mr. Ross received an A.B. degree in political science from Tufts University, obtained both J.D. and M.B.A. degrees from Boston University, and was admitted to the Massachusetts Bar. He recently completed an International Business Management Program at Georgetown University.